

Testimony of Joseph T Pokalsky
Georgia Power's 2019 Rate Case Docket 42516
On Behalf of
Resource Supply Management

1 **Q. State your name and position.**

2
3 **A.** My name is Joseph T. Pokalsky (PO-KAHL-SKEE). I provide advisory services to the
4 energy and utility industry.

5
6 **Q. What are your credentials and background?**

7
8 **A.** I am a Chartered Financial Analyst (CFA). I earned an MBA in Finance from the Wharton
9 School of Business and a Masters in City and Regional Planning from the University of
10 Pennsylvania.

11
12 **Q. Summarize your relevant experience**

13
14 **A.** I have worked in energy market making; risk management including for market and tariff
15 design; asset optimization; process management and business transformation since 1991.
16 Prior to that, I worked for five years on Wall Street where I underwent training in Capital
17 Markets, conducting rotations in research and bank funding operations, and was a market
18 maker in interest rate and currency derivatives.

19
20 As a Director of Commodity and Regulatory Risk, Energy and Utility Advisory Services
21 for PricewaterhouseCoopers, LLP ("PwC"), I provided advisory services to a broad range
22 of clients across energy, power and utilities with a focus on commodity trading and risk
23 management; asset optimization including valuation and analytics; market and tariff
24 design; process and control design; compliance frameworks; organizational
25 transformation; and technology specification.

1 Prior to joining PwC I led an important transformational project for the New York
2 Mercantile Exchange (NYMEX) Energy Division. I also spent five years at Energy
3 Consulting Group, a service company for Cooperative Energy Inc. (CEI), a generation and
4 transmission corporation organized by seven electric membership corporations within the
5 Oglethorpe system in Georgia. My responsibilities included risk management, including
6 for long term market price exposure and load forecasting error as part of the groups rate
7 setting activities; pseudo generation dispatch and transmission service optimization; long
8 and short term market energy procurement and off-system sales; energy transaction
9 clearing and settlement analysis, counterparty contract and credit administration, financial
10 reporting, and representing CEI's interests in FERC regulatory forums.

11
12 Now, my professional roles include being Industry Advocate Member of the Committee of
13 Chief Risk Officers and Managing Director for Prosumers Energy. I am currently
14 managing for the CCRO the Best Practices in Risk Management initiative for power and
15 natural gas retailers where I lead a team of over 20 commercial operation and risk
16 management professionals from a variety of energy retailers ranging from retail energy
17 provider subsidiaries of large multinational energy firms to those focused solely on North
18 America markets. One of the areas of risk exposure that we have focused on is the
19 economic impact of market and rate design on customers.

20
21 **Q. Have you previously presented testimony before this Commission?**

22
23 **A.** Yes, for the 17th VCM hearings on behalf of Nuclear Watch South, I presented testimony
24 on my review and critique of the Quantitative Risk Assessment (QRA) for the Vogtle 3&4
25 units provided to the Commission by GPC's consultant PwC, as well as a comparison of
26 the then assumed marginal costs to complete the units versus that of a greenfield natural
27 gas fired combined cycle (CC) generation plant,

1 **Q. What is the purpose of your testimony today?**

2
3 **A.** I will point out the advantages of advanced rate design, such as Georgia Power
4 Corporation's (GPC) Real Time Pricing (RTP) rate design and how it benefits GPC, its
5 customers, and the utility system in Georgia. I urge the Commission to encourage Georgia
6 Power to make such RTP pricing available to more customers, particular existing
7 customers.
8

9 **Q. Are there defined characteristics for Advanced Rate Design?**

10
11 **A.** Yes, according to Ahmad Faruqui of the Brattle Group, advanced rate designs¹:

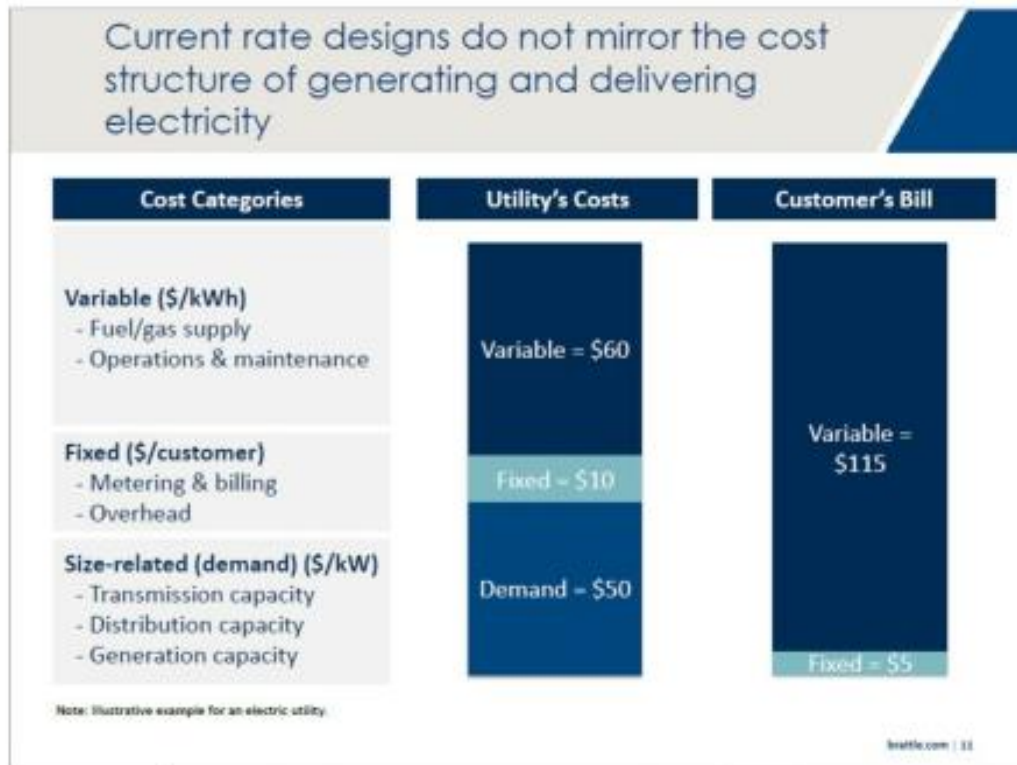
- 12 1. Reflect the cost structure of [generating and delivering] electricity and thereby promote
13 economic efficiency and equity
14 2. Allow customers to control their electricity use and bill
15 3. Incentivize energy efficiency and demand response and facilitate the development of
16 clean energy resources
17 4. Provide choices to customers
18

19 Current rate designs do not mirror the costs of generating and delivering electricity².
20
21
22
23
24
25
26

¹ "Advanced Rate Designs, The Eight FAQs", Ahmad Faruqui, Ph.D., July 15, 2019 p. 12

² Ibid. p. 11

This is illustrated in the graphic below from the Brattle Group.³



Fixed costs per customer such as metering and billing, variable costs per kWh of production such as fuel and variable O&M, and demand related costs per kW of system capacity are typically not reflected in a customer's bill which is based upon a volumetric usage charge for energy metered during the monthly billing cycle

³ Ibid, p. 11

1 **Q. Has the implementation of Advanced Rate Designs been shown to benefit utilities and**
2 **their customers?**

3
4 **A. Yes.**

5
6 For example it's been proven very beneficial to Oklahoma Gas and Electric (OG&E) and
7 its customers. In 2012 OG&E rolled out its SmartHours program in order to slow the
8 growth of peak hour's energy demand to avoid having to build additional capacity. The
9 program grew in participants from 40,000 in 2012 to over 130,000 customers in 2017, over
10 120,000 which are on a dynamic (hourly real-time) rate. Customers save an average of
11 \$150, roughly one-fifth, on their electric bill between June and September.⁴
12
13

14 **Q. Does GPC's Real Time Pricing (RTP) rates have characteristics of Advanced Rate**
15 **Design?**

16
17 **A. Partially, yes.**

18
19 The customer's bill for delivered energy mainly consists of charges for Customer Baseline
20 Load (CBL) charges and for Incremental Energy.
21

22 The CBL represents a customer's normal operation for billing under its conventional tariff.
23 The CBL is initially developed using either customer-specific hourly firm load data or
24 monthly billing determinant data that represents the electricity consumption pattern and
25 level agreed to by the customer and Georgia Power.
26

⁴ "Innovations in Pricing: Giving Customers What They Want", Ahmad Faruqui, Electrical Perspectives, September-October 2017, p. 40.

Incremental Energy, or load in addition to the CBL, is billed at RTP prices. RTP prices are determined based on projections of the hourly production cost of incremental generation (including approved environmental costs), provisions for losses, projections of hourly transmission costs and reliability capacity costs for each day, when applicable.

I've enhanced the graphic from page 4 to illustrate this.



Q. What are the advantages of the RTP rates to GPC?

A. GPC transfers the risk of hourly volumetric uncertainty and price risk for Incremental Energy to the customer. Additionally, customer response to RTP pricing signals such as demand reduction, load shifting, etc. can potentially allow GPC to defer or cancel planned additions to system capacity.

1
2 **Q. What are the advantages of the RTP rates to customers?**

3
4 **A.** Customers pay a lower price for Incremental Energy than they do for energy under their
5 Customer Baseload Charge rate. This saves them money. They can manage their price
6 risk exposure for Incremental Energy with third party intermediaries and/or manage their
7 usage by implementing operational controls and/or installing inside the fence distributed
8 energy resources (DER)
9

10
11 **Q. What are the advantages of marginal-cost or real time pricing to the utility system in**
12 **GA?**

13
14 **A.** Utility rate structures were originally developed in a monopolistic environment, prior to
15 the advances in information technology, where integrated production and distribution
16 utilities primarily recovered fixed and variable costs through a monthly metered volumetric
17 usage charge for customer segments that assumed each ratepayer within a customer
18 segment had identical load profiles.
19

20 Technological advances in Advanced Meter Infrastructure (AMI) facilitate continuous and
21 instantaneous metering and allows a customer's load profile to be measured, not estimated.
22

23 The Internet of Things (IoT) not only allows for customers to monitor their energy usage
24 in near real-time, but also to better manage their energy costs by controlling their usage in
25 near real time through demand reduction, load shifting, peak load management, and other
26 methods such as investment in rooftop solar generation and battery storage.
27

1 Real time pricing is required in order to realize the potential benefits of these grid edge,
2 non-wire technologies. Only a rate plan with a real time prices can send to both the
3 customer and the utility the economic signals needed to determine if investment in these
4 technologies is viable, for what purpose, where, and by whom.

5
6 Rational price signals for electric energy are required to guide the investment process in
7 order to extract the most value for ratepayers, on an equitable basis, for both the current
8 and future configuration of the energy production and delivery system in Georgia.

9
10 **Q. Is there customer interest in GPC's RTP rate plans?**

11
12 **A.** Yes.

13
14 Customers under the RTP rates are requesting to have their CBL lowered so that they can
15 purchase more energy under the Incremental Rate.

16
17 In its response to a hearing question of "How many CBL change requests did the Company
18 receive in the last 12 months and how many were approved?"⁵, GPC responded that 31
19 were approved and implemented. Unfortunately, GPC did not answer the question as to
20 how many change requests were received which would have provided a better measure of
21 interest for Incremental Energy.

22
23
24

⁵ Georgia Power Company, Docket 42516, Georgia Power Company's 2019 Rate Case, Response to Hearing Request No. 8.

1 **Q. What are your recommendations?**

2
3 **A.** To benefit GPC, its customers, and the utility system in Georgia, the Commission in its
4 final order should require that Georgia Power give existing customers the same RTP rate
5 choices and options given to new customers.
6

7 **Q. Does this conclude your Testimony?**

8
9 **A.** Yes
10
11